

Title (en)

Process for producing cis-(+,-)-3,4-dihydro-N,N,2-trimethyl-2H-1-benzopyran-3-amine, intermediates produced thereby and their preparation.

Title (de)

Verfahren zur Herstellung von cis-(+,-)-3,4-Dihydro-N,N,2-trimethyl-2H-1-benzopyran-3-amin, so erhaltene Zwischenprodukte und deren Herstellung.

Title (fr)

Procédé de préparation de cis-(+,-)-3,4-dihydro-N,N,2-triméthyl-2H-1-benzopyrane-3-amine, produits intermédiaires obtenus dans ce procédé et leur préparation.

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Application

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- CA 337266 A 19791010
- JP 13650079 A 19791024
- US 89640378 A 19780414
- ZA 795478 A 19791012

Abstract (en)

A process for the preparation of cis-(+/-)-3,4-dihydro-N,N,2-trimethyl-2H-1-benzopyran-3-amine (I), a known anti-depressant, is disclosed. The process of the invention is a multi-step process starting with 2-methyl-2H-1-benzopyran (II), which involves the production of the novel intermediates (2 alpha, 3 beta, 4 alpha)-(+/)-3,4-dihydro-2-methyl-4-(methylamino)-2H-1-benzopyran-3-ol (IV) and its hydrogen sulphate ester (V), as well as (1a alpha, 2 beta, 7b alpha)-(+/)-1,1a,2,7b-tetrahydro-1,2-dimethyl-[1]benzopyrano-[3,4-b]a zirine (VI) and cis-(+/-)-3,4-dihydro-N,2-dimethyl-2H-1-benzopyran-3-amine (VII). In the final step of the process, the novel compound VII is methylated to form the desired compound I. The process is less expensive, less hazardous and less difficult than known ways of producing compound I. Compounds IV and V have the formula: <CHEM> where X is -OH and -OSO₃H respectively. Compound VI has the formula: <CHEM> Compound VII has the formula: <CHEM> V

IPC 1-7

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Citation (search report)

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